



UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
Address: COMMISSIONER FOR PATENTS
P.O. Box 1450
Alexandria, Virginia 22313-1450
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
-----------------	-------------	----------------------	---------------------	------------------

10/591,689

06/06/2007

Martin Backstrom

3772-35

4776

23117 7590 06/16/2010
NIXON & VANDERHYE, PC
901 NORTH GLEBE ROAD, 11TH FLOOR
ARLINGTON, VA 22203

EXAMINER

DOAN, PHUOC HUU

ART UNIT

PAPER NUMBER

2617

MAIL DATE

DELIVERY MODE

06/16/2010

PAPER

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Office Action Summary	Application No. 10/591,689	Applicant(s) BACKSTROM ET AL.	
	Examiner PHUOC DOAN	Art Unit 2617	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 30 April 2010.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 17-32 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 17-19 and 21-32 is/are rejected.
- 7) ☒ Claim(s) 20 is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|---|---|
| 1) <input type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413) |
| 2) <input type="checkbox"/> Notice of Draftperson's Patent Drawing Review (PTO-948) | Paper No(s)/Mail Date. _____ |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08) | 5) <input type="checkbox"/> Notice of Informal Patent Application |
| Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____ |

DETAILED ACTION

Response to Arguments

1. Applicant's arguments with respect to claims 17-32 have been considered but are moot in view of the new ground(s) of rejection.

Claim Rejections - 35 USC § 103

2. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

Claim 31 is rejected under 35 U.S.C. 103(a) as being unpatentable over Saidi in view of Schroderus (US Pub No: 2003/0223381).

As to claim 31, Saidi does not disclose the receiver comprises means for converting speech into an analogue or digital electrical signal.

Schroderus discloses that the receiver 302 comprises means for converting speech into an analogue or digital electrical signal (par [0052] “the analogue speech signal processed in associated an analog to digital (A/D), and vo-encoding, vo-decoding for converting”).

It would have been obvious to one having skilled in the art at the time the

invention was made to include the A/D converter of Schroderus to the terminal of Saidi in order to use the device in the digital communication system.

3. Claims 17-18, 21, and 25-27, 28-30, 32 are rejected under 35 U.S.C. 103(a) as being unpatentable over Saidi in view of Harris (US Pub No: 2003/0115045).

As to claim 17, 29, Saidi discloses a method of processing user speech data at a processing entity for transmission to a participant or participants in a push to talk session over a communications network (Fig. 1, par [0016-0017] “**a group communication system 100 is also known as a push to talk (PTT) system**”), the method comprising: following initiation of a push to talk session (par [0031, 0037] “before the initial media activity”), but prior to receipt by the entity of a session acceptance from the or each participant (par [0037] “**before the media is transmitted over the network**”); and removing an initial period of silence from the speech data prior to sending the speech data to a receiving terminal of the or each other participant (par [0037] “**suppressed before the media is transmitted**”).

Saidi does not disclose analyzing the speech data to identify an initial period of silence.

But, Harris discloses that silence frames can be identified in a PTT communication (par [0011]). It would have been obvious to one having skilled in the art at the time the invention was made to include the silence detection of Harris into the PTT communication of Saidi so that silence frames do not need to be actually sent.

As to claim 18, Saidi further discloses method according to claim 17, wherein said speech data is an initial speech burst provided by the initiating party of the push to talk session (par [0037] “initial media spurt, may be suppressed before the media is transmitted over the network”).

As to claim 21, Saidi further discloses a method according to claim 17, wherein the step of removing an initial period of silence from the transmitted speech data is carried out at a terminal of the initiating party or a node within the communication network (par [0037]).

As to claim 25, Saidi further discloses a method according to claim 17, further comprising predefining an initial period expected to contain silence, and clipping the start of the speech data remove the predefined period (Fig. 5, par [0040-0041] “ predefined period based on number of frame is suppressed”).

As to claim 26, Saidi further discloses a method according to claim 25, wherein the predefined period is fixed or is adapted in dependence upon subscriber behaviour (par [0038] “three initial silence frames”).

As to claim 27, Saidi discloses a server node (Fig. 3, item 308) for use in a communication network offering a push to talk service to subscribers (302, 304, 306), the node comprising: inherently a receiver for receiving a speech burst from a participant in a push to talk session (Fig. 3; par [0030] “**Numerals 302, 310, 308**”), and a processor (**230 of the PTT subscriber 206**) for, following initiation of a push to talk session but prior to receipt by the network of a session acceptance from a receiving participant (par [0031, 0037] “**before the initial media activity**”); and removing the detected period of silence from the speech data prior to transmission to the or each other participant in the session (par [0037] “**suppressed before the media is transmitted**”). Saidi does not disclose analyzing the speech data to identify an initial period of silence.

But, Harris discloses that silence frames can be identified in a PTT communication (par [0011]). It would have been obvious to one having skilled in the art at the time the invention was made to include the silence detection of Harris into the PTT communication of Saidi so that silence

frames do not need to be actually sent. Harris et al also teach that a server FNE can be used to remove the silent frames (par [0013]).

As to claim 32, Saidi further discloses a terminal according to claim 29, wherein the receiver (210, 212, and 222) comprises means for receiving speech data over an interface link to said communication network (Fig. 2, item 208), the speech data having been generated at a peer mobile terminal (Fig. 3, Numerals 304, 306”).

As to claim 30, Saidi further discloses a terminal according to claim 29, the terminal being a wireless terminal and the communication network being a cellular telephone network offering a Push to talk Over Cellular service (par [0016-0017] “a group communication system 100, and 104, 106 which may be deployed such as cdma200 handset”).

4. Claims 19, 22-23, 28 are rejected under 35 U.S.C. 103(a) as being unpatentable over Saidi in view of Harris (US Pub No: 2003/0115045) and further in view of the Admitted Prior Art of the present invention, Page 1, lines 10-32.

As to claim 19, Saidi and Harris do not disclose that said communication network is a cellular telephone network and the push to talk

service is a Push to talk Over Cellular service. The admitted prior art teaches that said communication network is a cellular telephone network and the push to talk service is a Push to talk Over Cellular service (Page 1; lines 10-15). It would have been obvious to one having skilled in the art at the time the invention was made to include the Push to talk Over Cellular service into the system of Saidi in order apply the PTT in the 3G network.

As to claim 22, the Admitted Prior Art discloses that the network node is a Media Resource Function node (Page 1; lines 30-32).

As to claim 23, the Admitted Prior Art discloses that the network node is located within an IP Multimedia Subsystem (IMS) (Page 1; lines 29-30).

As to claim 28, Saidi and Harris do not disclose arranging to be located within an IP Multimedia Subsystem of a cellular telephone communications network, the node having an interface to one or more Session Initiation Protocol (SIP) servers including a Serving Call Session Control Function (S-CSCF) server. The admitted prior art discloses arranging to be located within an IP Multimedia Subsystem of a cellular telephone communications network, the node having an interface to one or more Session Initiation Protocol (SIP) servers including a Serving Call Session Control Function (S-CSCF) server (Page 1, lines 10-32). It would

have been obvious to one having skilled in the art at the time the invention was made to include the Push to talk Over Cellular service into the system of Saidi in order apply the PTT in the 3G network.

5. Claim 24 is rejected under 35 U.S.C. 103(a) as being unpatentable over Saidi in view of Harris (US Pub No: 2003/0115045) and further in view of Doran (US Pub No: 2004/0121812).

As to claim 24, Saidi and Harris do not disclose further comprising monitoring the audio level to determine when speech has started.

But, Doran discloses monitoring the audio level to determine when speech has started (par [0014]). It would have been obvious to one having skilled in the art at the time the invention was made to include the speech recognition of Doran into the system of Saidi in order to detect the beginning of speech.

Allowable Subject Matter

6. Claim 20 is objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

Conclusion

7. Any inquiry concerning this communication or earlier communications from the examiner should be directed to PHUOC DOAN whose telephone number is (571)272-7920. The examiner can normally be reached on 10:00AM to 6:00PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, LESTER KINCAID can be reached on 571-272-7922. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

Application/Control Number: 10/591,689
Art Unit: 2617

Page 10

/PHUOC DOAN/
Examiner, Art Unit 2617